Final Review HW Packet

Geometry

Name:\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ TP:\_\_\_\_\_

FAILURE TO WRITE IN COMPELTE SENTENCES OR SHOW ALL WORK WILL RESULT IN LASALLE.

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| Linear Functions | |
| 1. Kevin Amoah is playing soccer on a giant coordiante grid and kicks the ball from the point (1,2). The goalie is standing right where Kevin shoots it and saves the shot at (4,4). What is the slope of the line that the ball took? | 1. A You lean against a wall. Your feet are 10 cm away from the wall and your head touches the wall at a point 170 cm off the ground. What is the slope of your body? |
| 1. Write the slope-intercept form of the equation of the line through the given points.      1. Through: (-4,5) and (4,-5)    2. Through: (1,-5) and (0,-4) | 1. The following equations are in standard form. Rewrite each equation in slope-intercept form.      1. 11x + 6y = 36    2. 2x + 5y = -5 |
| 1. Macintosh HD:Users:rmitrovich:.Trash:Screen Shot 2015-10-08 at 5.38.47 AM.pngWrite an equation to describe f(x) below. Then graph the equation.  |  |  |  |  |  |  | | --- | --- | --- | --- | --- | --- | | x | -3 | 0 | 6 | 12 | 15 | | f(x) | 8 | 10 | 14 | 18 | 20 | | |
| |  |  |  |  |  |  | | --- | --- | --- | --- | --- | --- | | x |  |  |  |  |  | | F(x) |  |  |  |  |  |  1. Complete the table below and find an expression to represent each tile pattern. Describe what each term in your equation means in terms of the stages and total amount of tiles.  |  |  |  | | --- | --- | --- | | Macintosh HD:Users:rmitrovich:Desktop:Screen Shot 2015-09-01 at 1.19.24 PM.pngStage 1 | Macintosh HD:Users:rmitrovich:Desktop:Screen Shot 2015-09-01 at 1.19.24 PM.pngStage 2 | Macintosh HD:Users:rmitrovich:Desktop:Screen Shot 2015-09-01 at 1.19.24 PM.pngStage 3 | | |
| 1. Complete the table below and find an expression to represent each tile pattern. Describe what each term in your equation means in terms of the stages and total amount of tiles.  |  |  |  | | --- | --- | --- | | Stage 1 | Stage 2 | Stage 3 |  |  |  |  |  |  |  | | --- | --- | --- | --- | --- | --- | | x |  |  |  |  |  | | F(x) |  |  |  |  |  | | |

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| Distance + Mid-point | |
| 1. On the number line, what is the distance between:    1. -4 and -2    2. -10 and 20 | 1. In the coordinate plane, find the distance between the two points:    1. (3,5) and (-5,1)    2. (-7,-8) and (2,3) |
| 1. A line segment has end points (10,-2) and (2,8). Find the midpoint. | 1. A line segment has end points (2,10) and (-7,-10) |

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| Transformations | |
| 1. What is the image of A(-4,-8) after being reflect about the line *y=x*? | 1. Point A(2,7) has been rotated 90 degrees clockwise. Find the coordinates of A’. |
| 1. Write the equation of a line that is parallel to y=4x-1 and goes through the point (-2,-7). | 1. Write the equation of a line that is perpendicular. |
| 1. Point *A*(5,8) is shifted 4 units down and 10 units to the left. What are the coordinates of A’? | |
| 1. Macintosh HD:Users:rmitrovich:.Trash:Screen Shot 2015-10-08 at 5.38.47 AM.png a. Graph the line y = x – 4     b. Shift the line down up 9 units.      c. Write the equation of the shifted line.      d. Describe the relationship between the original line and the shifted line. | |

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| Angles | |
| 1. In the figure below, lines *p* and *q* are parallel, and the measure of angle 5 is 55 degrees. Find the measure of angle 8. | 1. Solve for x, then find the measure of angle A.   C:\Users\kramos\Desktop\MC_P1.PNG  C  B  A |
| 1. BD bisects . Find the measure of | 1. Find the .   C:\Users\kramos\Desktop\MC_P2.PNG |
| 1. A new racetrack is being designed and will be composed of a long rectangle with a semi-circle on each of the shorter sides as shown in the diagram below. The rectangle is 75 ft. long and 20 ft. wide. All measurements are given in yards. What is the area of the racetrack?   75  20 | |

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| 1. Find the area of rectangle ABCD with vertices at A(-3,0), B(3,2), C(4,-1), and D(-2,-3)   Macintosh HD:Users:rmitrovich:.Trash:Screen Shot 2015-10-08 at 5.38.47 AM.png | |
| Congruent Triangles | |
| 1. Prove that the two triangles are congruent.   C:\Users\kramos\Desktop\CW#54_ALL congruent triangles\ET_1.PNG | 1. Prove triangle ABE is congruent to triangle CBD. |
| 27.   Given  Prove ∆*IKJ* ≅∆*HKJ* | 1. Prove triangle LKJ is congruent to triangle LWJ.   Macintosh HD:Users:rmitrovich:Desktop:Screen Shot 2015-11-29 at 5.17.50 PM.png |